## IV. REMARKS REGARDING AMENDMENT TO THE SPECIFICATION AND CLAIMS.

The Specification has been amended at page 5, line 2; page 7, lines 11-12; and page 8, lines 19-20.

The amendments to the Specification at page 5, line 2, and page 7, lines 11-12, were made to correct the typographical errors in the misspelling of the term poly [bis (N-methyl-N-hexylamino)phenylenevinylene]. That the term poly [bis (N-methyl-N-hexylamino)phenylenevinylene] was intended is clear from the reference to "at least one of polydialkylaminophenylenevinylene including" immediately followed by the misspelled term and by the abbreviation "BAM-PPV" immediately following the misspelled term. It is well understood in the art that "PPV" is the abbreviation for polyphenylenevinylene, not for polyphenylenediamino.

The amendments to the Specification at page 8, lines 19-20, were made to correct the erroneous reference to organic resins as "inorganic" and to delete the duplicative reference to "nylons,", as suggested by the Examiner.

No new matter has been added by any amendment to the Specification.

Claims 3 and 14 have been amended to overcome the rejections made under 35 U.S.C. §112 by deletion of the indefinite term "derivative". Claims 2-4, 6, 10, 13-16 and 21 have been amended to overcome the rejections made under 35 U.S.C. §112 by properly describing Markush groups or omitting reference to Markush groups. Finally, Claims 5, 11, 17, and 22-24 have been canceled.

No new matter has been added by any amendment to the Claims.

As amended, Claims 1-4, 6-10, 12-16 and 18-21 are believed to be in condition for allowance.

New claims 25-33 have been added. New Claims 25-33 find support throughout the specification and claims originally filed, and more particularly at page 4, line 5 through page 5, line 9; page 6, line 2 through page 7, line 21; page 8, line 14 through page 9, line 2; page 9, line 6 through page 15, line 11; and Claims 1-24 as originally filed.

No new matter has been added by the addition of any Claims.

# V. REPLY TO REJECTION OF CLAIMS 2-6, 10, 13-16, 21, 23 AND 24 UNDER 35 U.S.C. §112, SECOND PARAGRAPH.

Claims 2-6, 10, 13-16, 21, 23 and 24 have been rejected under 35 U.S.C. §112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which Applicant regards as the invention on the grounds the claims contain improper Markush language. Claims 3 and 14 have been rejected under 35 U.S.C. §112, second paragraph, on the additional grounds that the term "derivative" renders the claims indefinite. In reply Applicant has: (1) amended Claims 3 and 14 to delete the indefinite term "derivative"; (2) canceled Claims 5, 23 and 24; and, (3) amended Claims 2-4, 6, 10, 13-16 and 21 to properly describe Markush groups or to omit reference to Markush groups.

For the foregoing reasons, it is submitted that presently pending Claims 2-4, 6, 10, 13-16 and 21 comply with 35 U.S.C. §112, second paragraph, and that the rejection should be withdrawn.

## VI. REPLY TO PROVISIONAL NONSTATUTORY OBVIOUSNESS-TYPE DOUBLE PATENTING REJECTION OF CLAIMS 1-24.

Claims 1-24 have been provisionally rejected over claims 1-19 of co-pending Application No. 10/714,296. The Office Action asserts, at page 3, lines 12-16, that "Although the conflicting claims are not identical, they are not patentably distinct from each other because the claims of the copending application encompass the claims of the instant application." In reply, Applicant has accepted the Examiner's suggestion to file a terminal disclaimer as to Claims 1-24. A terminal disclaimer in compliance with 37 CFR § 1.321(c) as to any patent granted on the present application is submitted and filed concurrently with this Reply. Accordingly, the provisional rejection of Claims 1-24 under the nonstatutory doctrine of obviousness-type double patenting has been overcome and should be withdrawn.

# VII. REPLY TO REJECTION OF CLAIMS 1-3, 5-9, 12-14, 16-20 and 23 UNDER 35 U.S.C. §102(b) or (e).

Independent Claim 1 and dependent Claims 2, 3, 5, 6, 7, 8 and 9 have been rejected under 35 U.S.C. §102(b) or (e) as being anticipated by U.S. Patent No. 6,465,558 to Scheibelhoffer, et al. ("Scheibelhoffer '558") or by U.S. Patent No. 6,503,569 to Sneddon ("Sneddon '569") or by U.S. Patent No. 6,762,234 to Grizzi ("Grizzi '234") with U.S. Patent No. 4,963,615 to Yuto ("Yuto '615") as evidence. In addition, Claims 1-3, 5-9, 12-14, and 16-20 have been rejected under 35 U.S.C. §102(b) as being anticipated by U.S. Patent No. 5,834,533 to Patel, et al. ("Patel '533"). Lastly, Claim 23 has been rejected under 35 U.S.C. §102(e) as being anticipated by U.S. Patent Application publication 2004/0176263 to Filippini, et al. ("Filippini '263").

In reply Applicant emphasizes that a claim is anticipated if, and only if, each and every element in the claim is found, either expressly or inherently, in a *single* prior art reference. *In re Robertson*, 169 F.3d 743, 745, 49 USPQ2d 1949, 1950 (Fed. Cir. 1999); *Constant v. Advanced Micro-Devices, Inc.*, 848 F.2d 1560, 1571, 7 USPQ2d 1057, 1064 (Fed. Cir. 1988). When anticipation is based on inherency of limitations not expressly disclosed in the assertedly anticipating reference, it must be shown that the undisclosed information was known to be present in the subject matter of the reference. *Continental Can Co. USA, Inc. v. Monsanto Co.*, 948 F.2d 1264, 1269, 20 USPQ2d 1746, 1749-50 (Fed. Cir. 1991). An inherent limitation is one that is necessarily present. *Scaltech, Inc. v. Retec/Tetra, LLC.*, 178 F.3d 1378, 1384, 51 USPQ2d 1055, 1059 (Fed. Cir. 1999). Applicant will show that no anticipation exists here for the reason that the claims are directed to formulations of terpenes or terpinoids together with polydialkylaminophenylene vinylenes or with polydialkyloxyphenylene vinylenes which formulations none of the references cited in the Office Action disclose or suggest.

## A. Reply Re: §102(b) or (e) Rejection of Claims 1 and 2 Over Scheibelhoffer '558.

The Office Action asserts, at page 3, line 29 through page 4, line 6, that "Scheibelhoffer et al. disclose polymer and solvent in claim 1, terpenes in claim 2, dipentene, limonene and pinene in claim 3, blend of organic solvents in claim 7, olefinpolymers in claim 10, styrene as the olefin in claims 13-15 and d-limonene in claims 20 and 21. Sneddon teaches styrenic copolymers and terpenes in claims 1-3 and spray coating in column 6, lines 38-40. Grizzi recites polymer and terpene in claims 1-4, polymer, alkylated solvent, terpene blends in Examples 1-4

and conducting polymers in column 3, lines 20-26. Yuto defines conjugated polymers as styrene-butadiene copolymers in column 3, lines 1-35."

In reply Applicant points out that Scheibelhoffer '558 discloses a terpene solvent system together with a polymer. However, the only polymers disclosed by Scheibelhoffer '558 are: polyolefins derived from ethylene, propylene, butylene and/or styrene (column 3: line 54 through column 4: line 5); polymers derived from vinyl aromatic monomers (column 7: lines 6-8); copolymers or terpolymers of one or more olefins, such as aliphatic or aromatic olefins, and functionalized derivatives thereof, ethylene, propylene, or a member of the homologous series of olefins polymerized with vinyl acetate, acrylic or methacrylic acid or their esters, a diene, such as butadiene or isoprene or their hydrogenated derivatives thereof and mixtures thereof (3:42-49); polypropylene and ethylene propylene copolymers (4:3-5); ethylene-olefin copolymers (4:18-22); ethylene-alpha-olefin copolymers of butene, pentene, hexene, heptene, octene, nonene, and decene (4:18-22); copolymers of ethylene ethyl acrylates (5:33); copolymers of ethylene butyl acrylates (5:36); polymers of vinyl aromatic monomers of styrene and substituted styrenes (6:13-16); polymers and copolymers of conjugated dienes (6:65-7:5); copolymers of ethylene-vinyl acetate (10:38-50); and, mixtures of these polymers and copolymers (11:14-63). Applicant strongly emphasizes that Scheibelhoffer '558 does not reference, disclose, teach or suggest the use of polyphenylenevinylene in any form whatsoever.

Applicant emphasizes that Scheibelhoffer '558 does <u>not</u> disclose the combination of polydialkylaminophenylenevinylene with terpenes or terpenoids as affirmatively claimed in Claim 1, as presently amended. Further, Scheibelhoffer '558 does <u>not</u> disclose the combination

of polydialkyloxyphenylenevinylene with terpenes or terpenoids as affirmatively claimed in Claim 2, as presently amended. Because Scheibelhoffer '558 does <u>not</u> disclose *each and every element* of Claim 1, as presently amended, or of Claim 2, as presently amended, Scheibelhoffer '558 does not anticipate presently amended Claims 1 and 2 under §102(b) or (e).

### B. Reply Re: §102(b) or (e) Rejection of Claims 3 and 5-9 Over Scheibelhoffer '558.

Dependent claim 5 has been canceled. Dependent claims 3 and 6-9 each depend from independent claims 1 or 2, or depend from dependent claims that depend from independent claims 1 or 2. Dependent claim 3 depends from independent claims 1 or 2. Dependent claim 6 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claim 7 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claims 8 depends from independent claims 1 or 2, or from dependent claims 3, 4, 6 or 7 which depend from independent claims 1 or 2, or from dependent claims 1 or 2, or from dependent claims 1 or 2, or from dependent claims 1 or 2.

The facts and argument offered in reply to the rejection under Scheibelhoffer '558 of independent claims 1 and 2 are incorporated by reference in reply herein to the rejection of dependent claims 3 and 6-9. A dependent claim includes all of the claim limitations of the claim from which it depends. If the independent claim from which a depend claim ultimately depends is not anticipated under §102(b) or (e) because the cited prior art reference does not disclose each and every element of that independent claim, then the reference necessarily cannot each and every element of any dependent claim depending from that independent claim. Because

Scheibelhoffer '558 does <u>not</u> disclose *each and every element* of Claim 1, as presently amended, or of Claim 2, as presently amended, Scheibelhoffer '558 does not anticipate under §102(b) or (e) the presently amended dependent Claims 3 and 6-9 which depend ultimately from independent Claims 1 or 2.

## C. Reply Re: §102(b) or (e) Rejection of Claims 1 and 2 Over Sneddon '569.

The Office Action asserts, at page 4, lines 2-6, that "Sneddon teaches styrenic copolymers and terpenes in claims 1-3 and spray coating in column 6, lines 38-40." And, that "Yuto [U.S. Patent 4,963,615] defines conjugated polymers as styrene-butadiene copolymers in column 3, lines 1-35."

In reply Applicant points out that Sneddon '569 discloses a terpene solvent system together with a polymer. However, the *only* polymers disclosed by Sneddon '569 are styrene based thermoplastic polymers (column 4: lines 25-27 and column 5: lines 22-25). Sneddon '569 specifically discloses only the following polymers: copolymers of butadiene, isoprene and chloroprene with styrene (5:24-26); styrene butadiene rubber (5:26-27); styrene-butadiene-styrene block copolymer (5:28-29); block copolymers of polystyrene and polyisoprene, polybutadiene, poly(ethylene-propylene), or polypropylene (5:29-33); styrene-ethylene-butylene-styrene block copolymers; and, styrene-ethylene-propylene-block copolymers (5:33-41).

Applicant emphasizes that <u>Sneddon '569 does not disclose or teach at least one polymer</u> selected from the group of polydialkylaminophenylene vinylenes in combination with terpenes or terpenoids as affirmatively claimed in independent Claim 1, as presently amended, <u>and does not disclose or teach at least one polymer selected from the group of polydialkyloxyphenylene</u>

vinylenes in combination with terpenes or terpenoids as affirmatively claimed in independent Claim 2, as presently amended. Because Sneddon '569 does not disclose each and every element of Claim 1, as presently amended, or of Claim 2, as presently amended, Sneddon '569 does not anticipate presently amended Claims 1 and 2 under §102(b) or (e).

### D. Reply Re: §102(b) or (e) Rejection of Claims 3 and 5-9 Over Sneddon '569.

Dependent claim 5 has been canceled. Dependent claims 3 and 6-9 each depend from independent claims 1 or 2, or depend from dependent claims that depend from independent claims 1 or 2. Dependent claim 3 depends from independent claims 1 or 2. Dependent claim 6 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claim 7 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claim 8 depends from independent claims 1 or 2, or from dependent claims 3, 4, 6 or 7 which depend from independent claims 1 or 2, or from dependent claims 1 or 2, or from dependent claims 1 or 2.

The facts and argument offered in reply to the rejection under Sneddon '569 of independent claims 1 and 2 are incorporated by reference in reply herein to the rejection of dependent claims 3 and 6-9. A dependent claim includes all of the claim limitations of the claim from which it depends. If the independent claim from which a depend claim ultimately depends is not anticipated under §102(b) or (e) because the cited prior art reference does not disclose each and every element of that independent claim, then the reference necessarily cannot each and every element of any dependent claim depending from that independent claim. Because Sneddon

'569 does <u>not</u> disclose *each and every element* of Claim 1, as presently amended, or of Claim 2, as presently amended, Sneddon '569 does not anticipate under §102(b) or (e) the presently amended dependent Claims 3 and 6-9 which depend ultimately from independent Claims 1 or 2.

#### E. Reply Re: §102(b) or (e) Rejection of Claims 1 and 2 Over Grizzi '234.

The Office Action asserts, at page 4, lines 2-6, that "Grizzi recites polymer and terpene in claims 1-4, polymer, alkylated solvent, terpene blends in Examples 1-4 and conducting polymers in column 3, lines 20-26." And, that "Yuto [U.S. Patent 4,963,615] defines conjugated polymers as styrene-butadiene copolymers in column 3, lines 1-35."

In reply Applicant points out that Grizzi '234 discloses a formulation comprising a conjugated polymer dissolved in a solvent selected from the group consisting of terpenes and polyalkylated aromatic compounds (2:45-49). However, Grizzi '234 discloses only the following generic types of polymers: polyaniline and derivatives; polythiophenes and derivatives; polypyrrole and derivatives; polyethylene dioxythiophene; polystyrene sulphonic acid-doped polyethylene dioxythiophene; polyphenylenes and derivatives; polyphenylene vinylenes and derivatives; polyfluorenes and derivatives; and, tri-aryl containing polymers and derivatives (3:17-37). Applicant points out that the only polymers specifically identified by Grizzi '234 are: (1) poly-9.9'-dioctylfluorene doped with a copolymer of poly-9.9'-dioctylfluorene and benzothiadiazole; and, (2) a copolymer of 9.9'-dioctylfluorene and N, N'-diphenyl-(4-s-butylphenyl) amine (3:44-50). Grizzi '234 does not disclose any specific class of derivatives of the generic polymers it lists. Applicant strongly emphasizes that Grizzi '234 does not teach any particular or specific polyphenylene vinylene, and does not teach polydialkylaminophenylene vinylene or polydialkyloxyphenylene vinylene as affirmatively claimed in amended Claims 1 and

12, and in Claims 2 and 13, respectively. Additionally, Grizzi '234 does not disclose any generic or specific groups of derivatives of the polyphenylene vinylenes. What is more, the Office Action concedes, at page 2, lines 15-16, that the term "derivative" is indefinite in any event and can provide no meaningful disclosure of inventive subject matter.

The polyphenylenevinylenes are a very broad class of conjugated polymers having the general structure:

$$R_5$$
 $R_2$ 

where the  $R_2$  and  $R_5$  refer to substituent groups.

In the case of the polydialkyloxyphenylenevinylenes, the substituent groups have the general structure R<sub>2</sub> equals O-X and R<sub>5</sub> equals O-Y, where X and Y are alkyl groups. In the special case of MEH-PPV, for example, the R<sub>2</sub> is OCH<sub>3</sub> and the R<sub>5</sub> is OC<sub>8</sub>H<sub>17</sub> and the molecule has the following structure:

Structure of Poly[2-methoxy-5-(2'-ethylhexyloxy)-1,4-phenylenevinylene] (MEH-PPV)

Applicant emphasizes that, contrary to the assertion in the Office Action, the Grizzi '234 patent does <u>not</u> include, disclose or teach the combination of terpenes or terpenoids with the particular substituted phenylenevinylene having the structure of polydialkylaminophenylenevinylene as affirmatively claimed in Claim 1, as presently amended. Further, Grizzi, '234 does <u>not</u> include, disclose or teach the combination of terpenes or terpenoids with the particular substituted phenylenevinylene having the structure of polydialkyloxyphenylenevinylene as affirmatively claimed in Claim 2, as presently amended.

Because Grizzi '234 does <u>not</u> disclose *each and every element* of Claim 1, as presently amended, or of Claim 2, as presently amended, Grizzi '234 does not anticipate presently amended Claims 1 and 2 under §102(b) or (e).

#### F. Reply Re: §102(b) or (e) Rejection of Claims 3 and 5-9 Over Grizzi '234.

Dependent claim 5 has been canceled. Dependent claims 3 and 6-9 each depend from independent claims 1 or 2, or depend from dependent claims that depend from independent claims 1 or 2. Dependent claim 3 depends from independent claims 1 or 2. Dependent claim 6 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claim 7 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claims 8 depends from independent claims 1 or 2, or from dependent claims 3, 4, 6 or 7 which depend from independent claims 1 or 2, or from dependent claims 1 or 2, or from dependent claims 1 or 2.

The facts and argument offered in reply to the rejection under Grizzi '234 of independent claims 1 and 2 are incorporated by reference in reply herein to the rejection of dependent claims 3 and 6-9. A dependent claim includes all of the claim limitations of the claim from which it depends. If the independent claim from which a depend claim ultimately depends is not anticipated under §102(b) or (e) because the cited prior art reference does not disclose each and every element of that independent claim, then the reference necessarily cannot each and every element of any dependent claim depending from that independent claim. Because Grizzi '234 does not disclose each and every element of Claim 1, as presently amended, or of Claim 2, as presently amended, Grizzi '234 does not anticipate under §102(b) or (e) the presently amended dependent Claims 3 and 6-9 which depend ultimately from independent Claims 1 or 2.

## G. Reply Re: §102(b) Rejection of Independent Claims 1, 2, 12 and 13 Over Patel '533.

The Office Action asserts, at page 4, lines 7-12, that "Patel et al. reveal polymer and terpenes in claim 1, terpenes blended with another organic solvent in claim 2, polystyrene and styrenic copolymers in claim 5, fatty acids and fatty acid salts (surfactants) in column 6, lines 11-43, concentrations in claims 19 and 27, column 6, lines 44-45 and the Examples."

In reply Applicant points out that Patel '533 discloses polypropylene glycol polymer having one or more methyl groups attached (column 3: lines 61-65 and column 4: lines 8-10); polysaccharides, cellulose, acrylamine-based polymers (4:28-30); an olefinic comonomer which can be polymerized with acrylamide – such as vinyl acetate, vinylpyridine, styrene, methyl methacrylate, acryloylpiperazine, methacryloylpiperazine, methacryloylmorpholine, methacrylamide, acrylonitrile, methacrylic acid, ammonium salt of methacrylic acid, alkali metal

salts of methacrylic acid, 2-methacryloyloxyethyltrimethylamine, 2-acrylamido-2-methylpropane sulfonic acid, alkali metal salts of 2-2-acrylamido-2-methylpropane sulfonic acid, acryloylmorpholine, N-4-butylphenylacrylamide, 2-acrylamido-2-methylpropane dimethylammonium chloride, 2-methacryloyloxyethyldiethylamine, 3-methacrylamidopropyldimethylamine, vinylsulfonic acids, alkali metal salts of vinylsulfonic acid, styrene sulfonic acid, alkali salts of styrene sulfonic acid, and N-vinyl-2-pyrrolidone (5:1-3 and 5:31-63); and, polyacrylonitrile, polystyrene sulfonate, lignosulfonates, and methylolated polyacrylamides (6:1-4).

Applicant strongly emphasizes that Patel '533 does not reference, disclose or teach the use of polyphenylenevinylene in any form whatsoever. Further, Applicant points out that Patel '533 does not disclose or teach at least one polymer selected from the group of polydialkylaminophenylene vinylenes in combination with terpenes or terpenoids as affirmatively claimed in independent Claims 1 and 12, as presently amended, and does not disclose or teach at least one polymer selected from the group of polydialkyloxyphenylene vinylenes in combination with terpenes or terpenoids as affirmatively claimed in independent Claims 2 and 13, as presently amended. Patel '533 does not disclose each and every element of independent Claims 1, 2, 12 or 13 as presently amended, and therefore Patel '533 does not anticipate any of presently amended Claims 1, 2, 12 and 13 under §102(b).

## H. Reply Re: §102(b) Rejection of Dependent Claims 3, 5-9, 14 and 16-20 Over Patel '533.

Dependent claims 5 and 17 have been canceled. Dependent claims 3 and 6-9 each depend from independent claims 1 or 2, or depend from dependent claims that depend from

independent claims 1 or 2. Dependent claim 3 depends from independent claims 1 or 2.

Dependent claim 6 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2. Dependent claim 7 depends from independent claims 1 or 2, or from dependent claims 3 or 4 which depend from independent claims 1 or 2.

Dependent claim 8 depends from independent claims 1 or 2, or from dependent claims 3, 4, 6 or 7 which depend from independent claims 1 or 2. Dependent claim 9 depends from independent claims 1 or 2.

Dependent claim 1 or 2, or from dependent claims 3, 4 or 6 which depend from independent claims 1 or 2.

Dependent claim 14 depends from independent claims 12 or 13. Dependent claim 16 depends from independent claim 13. Dependent claims 12 or 13.

The facts and argument offered in reply to the rejection under Patel '533 of independent claims 1, 2, 12 and 13 are incorporated by reference in reply herein to the rejection of dependent claims 3, 6-9, 14, 16 and 18-20. A dependent claim includes all of the claim limitations of the claim from which it depends. If the independent claim from which a depend claim ultimately depends is not anticipated under §102(b) because the cited prior art reference does not disclose each and every element of that independent claim, then the reference necessarily cannot each and every element of any dependent claim depending from that independent claim. Because Patel '533 does not disclose each and every element of independent Claims 1, 2, 12 or 13, as presently amended, Patel '533 does not anticipate under §102(b) the presently amended dependent Claims 3, 6-9, 14, 16 and 18-20 which depend ultimately from independent Claims 1 or 2.

#### I. Reply Re: §102(e) Rejection of Claim 23 Over Filippini '263.

The Office Action asserts, at page 4, lines 13-16, that "Filippini et al. divulge terpene in a solvent blend, water and surfactant in claim 1 and polyacrylates in claim 16." In reply, Applicant points out that Claim 23 has been canceled and is no longer pending in the present application for patent. Therefore, the present rejection of Claim 23 under 35 U.S.C. 102(e) is moot and should be withdrawn.

For all of the above reasons, it is believed that the rejection made under 35 U.S.C. §102(b) or (e) to independent Claims1, 2, 12 and 13 and to dependent Claims 3, 6-9, 14, 16 and 18-20 should be withdrawn, and such action is respectfully requested.

# VIII. REPLY TO REJECTION OF CLAIMS 1-3, 5-9, 12-14, 16-20 and 23 UNDER 35 U.S.C. §103(a).

Claims 1-3, 5-9, 12-14, 16-20 and 23 have been rejected as being unpatentable under 35 U.S.C. 103(a) over U.S. Patent No. 5,834,533 to Patel, et al. ("Patel '533"), U.S. Patent No. 6,465,558 to Scheibelhoffer, et al. ("Scheibelhoffer '558"), U.S. Patent No. 6,503,569 to Sneddon ("Sneddon '569"), U.S. Patent No. 6,762,234 to Grizzi ("Grizzi '234") or U.S. Patent Application publication 2004/0176263 to Filippini, et al. ("Filippini '263"). In reply, Applicant would emphasize that in order to establish prima facie obviousness, it is required that there be some evidence suggesting or showing why a particular modification would be made to a prior art device.

#### A. Reply Re: §103(a) Rejection of Independent Claims 1, 2, 12 and 13

It should be noted that herein above in reply to rejection of independent Claims 1, 2, 12 and 13 under 35 U.S.C. 102(b) or (e), and incorporated here by this reference, that the Scheibelhoffer '558 patent, the Sneddon '569 patent, the Grizzi '234 patent, the Patel '533 patent and the Filippini '263 publication do not disclose, teach or suggest the combination of terpenes or terpinoids with polydialkylaminophenylene vinylene as affirmatively claimed in independent Claims 1 and 12, as presently amended, and do not disclose, teach or suggest the combination of terpenes or terpinoids with polydialkyloxyphenylene vinylene as affirmatively claimed in independent Claims 2 and 13, as presently amended.

For the foregoing reasons, it is submitted that prima facie obviousness of the invention of independent Claims 1, 2, 12 and 13 has not been established and that the rejection under 35 U.S.C. 103(a) must be withdrawn.

#### B. Reply Re: §103(a) Rejection of Dependent Claims 3, 5-9, 14, 16-20 and 23

Claims 5, 11, 17 and 23 have been canceled. If an independent claim is nonobvious under 35 U.S.C. §103, than any claim depending therefrom is likewise nonobvious. See, *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1998). See also, *In re Hirao*, 535 F.2d 67, 190 USPQ 15 (CCPA 1976). Accordingly, because it has been shown that independent claims 1 and 2 are nonobvious, then it necessarily follows that dependent Claims 3 and 6-9, which depend from Claim 1 or Claim 2, are also nonobvious. Further, because it has been shown that independent Claims 12 and 13 are nonobvious, then it necessarily follows that dependent Claims 14, 16 and 18-20 which depend from Claim 12 or Claim 13 are also nonobvious. For each of the

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foregoing reasons, it is submitted that prima facie obviousness of dependent Claims 3, 6-9, 14, 16 and 18-20 has not been established and that the rejection under 35 U.S.C. §103(a) should be withdrawn.

#### IX. CONCLUSION.

For the foregoing reasons, it is believed that the application is now in condition for allowance.

Respectfully submitted,

Dated: June 12, 2006

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